

Title (en)

Etchant for chemical milling a high tungsten content superalloy and process.

Title (de)

Verfahren und Zusammensetzung zum chemischen Fräsen von Superlegierungen mit hohem Wolframgehalt.

Title (fr)

Procédé et composition pour l'usinage chimique de superalliages ayant une haute teneur de tungstène.

Publication

EP 0049678 A1 19820414 (EN)

Application

EP 81630056 A 19810923

Priority

US 19266780 A 19801001

Abstract (en)

[origin: US4353780A] Chemical milling of cast superalloys having high tungsten contents is advantageously accomplished with an etchant which consists by volume percent of 40-60 concentrated HNO₃, 0.6-0.8 concentrated HF, 30-70 H₂O, with which is included at least 0.008 moles/liter CuSO₄ and 0.0016-0.025 moles/liter FeCl₃. Preferably the molar ratio of CuSO₄ to FeCl₃ is 2:1 and etching is accomplished in the range 50 DEG -80 DEG C.

IPC 1-7

C23F 1/00; **C09K 13/04**

IPC 8 full level

C23F 1/26 (2006.01); **C23F 1/28** (2006.01); **C23F 3/06** (2006.01)

CPC (source: EP US)

C23F 1/28 (2013.01 - EP US)

Citation (search report)

- FR 2233418 A1 19750110 - OXY METAL INDUSTRIES CORP [US]
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DE4113177A1

Designated contracting state (EPC)

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DOCDB simple family (publication)

EP 0049678 A1 19820414; **EP 0049678 B1 19840912**; AU 546957 B2 19850926; AU 7562181 A 19820408; BR 8106058 A 19820608; CA 1161732 A 19840207; DE 3166049 D1 19841018; DK 413081 A 19820402; ES 505894 A0 19821201; ES 8301286 A1 19821201; IL 63861 A0 19811231; IL 63861 A 19840731; JP S5789483 A 19820603; NO 154553 B 19860707; NO 154553 C 19861022; NO 813192 L 19820402; US 4353780 A 19821012

DOCDB simple family (application)

EP 81630056 A 19810923; AU 7562181 A 19810923; BR 8106058 A 19810922; CA 386180 A 19810918; DE 3166049 T 19810923; DK 413081 A 19810917; ES 505894 A 19810930; IL 6386181 A 19810916; JP 15471681 A 19810928; NO 813192 A 19810921; US 19266780 A 19801001